

accaaaaaaaaactggatatacagaatcaagatctactaatccttcaaca
ATGGCAGAGAAAACCACCGACAAGGTATGCAGTAGTAGTGACTGGGGGGAACAAAGGGATA
M A E K T T S T R Y A V V T G G N K G I ◀ Motif I
GGATATGAAACATGCAGACAACTAGCAAGCAAAGGTGAGTGGTTGTTGACATCAAGA
G Y E T C R Q L A S K G V V V V L T S R
GATGAAAAGAAAGGCATTGAAGCTATTGAAGGCTAAGGAGGAGTCAAACTTCACTGAT
D E K K G I E A I E R L K E E S N F T D
GAACACATTGTTCATCAACTTGATATTATGGATCCAGCTAGTATTCTCTCTGTC
E H I L F H Q L D I M D P A S I S S L V
AACCTCATCAAACCAATTGGAAAGGCTCGATATTGATTAACACAGCAGGAATTCT
N L I K T K F G R L D I L I N N A G I S ◀ Motif II
GGAGTTATGGTAGAAGGGAGATGTACAAGTACTAAAGAGAGACTAGAAAGATATCTCA
G V M V E G D V Q V L K E I L E R Y I S
ATCGTTTTACTGAAGATGAAATGGAGAAGAGGGAGGTTGGACGAATCAGGTCTGGC
I V F T E D E N G E E G G W T K S G P G
AGTGTTACAATTATGAGTTGACAAAAGAATGCA TAGAGACAATTACTATGGTCAAAA
S V T N Y E L T K E C I E T N Y Y G A K
AGGATGACTGAAGCATTATCCCTCTCCTCAGCTCTCAATTCAACCAAGGATTGTTAAT
R M T E A F I P L L Q L S N S P R I V N
GTCGCTTCTAGCATGGAAAGTAAAGCTATTGTGCAACAAATGGCAATAGAAGTCTA
V A S M G K L K L L C N K W A I E V L
CGTGATGCTGATAGCCTCACAGAAAGGTAGATCAGGTGGTGAATGAATTCTCAA
R D A D S L T E E K V D Q V V N E F L K
GATTTCACAGAGAAATCAACAGAACATCCAAAGGATGGCCAAGTTACTTCACAGCCTACAAA
D F T E K S T E S K G W P S Y F T A Y K ◀ Motif III
GTCTCAAAGCATCGTTATGCCAACACAAGAGTTAGCTACAAATATCCGAATTT
V S K A S L I A Y T R V L A T K Y P N F
CGAATAAACTCTGTATGCTGGCTATTGCAAAACAGACGTAATGCAAATACTGGAGC
R I N S V C P G Y C K T D V N A N T G S
TTAACTGCTGGAGAAGGTGCTGAGAGCTGGTGAATCTGCTTGCTTCAAACGATGGA
L T A G E G A E S L V N L A L L P N D G
CCTTCTGGCTTTCTTTACAGAAAGGGTCACTTTTTGAgcattgttagatcca
P S G L F F Y R K E V T F F *
aaaaattggtttgogtattggcagaattgaatcggttttatcagtttatagacattg
caagaataaaagatggatatattcttttaagttaaaaaaaaaaaaaaaaaaaaaaaa
aaaaaaaa

Supplemental Figure S1. Nucleotide sequence and deduced amino acid sequence of the *CaMNR1* cDNA encoding the menthone: (+)-(3s)-neomenthol reductase protein. The deduced amino acid sequence is given below the nucleotide sequence. Translation start site is shown in bold type, termination codon is marked by an asterisk(*) and polyadenylated sequences are double-underlined. The amino acid sequences of conserved domains of SDR are underlined. Binding domain (Motif I: GXXXGXG), the structural domain of undefined function (Motif II: (N/C)NAG), and the active site YXXXX element (Motif III) are shown by upper lines.